

**Montana Board of Oil and Gas Conservation
Environmental Assessment**

Operator: Tyler Oil Company
Well Name/Number: Annette Freeland 13-26
Location: SW SW Section 26 T35N R3E
County: Toole MT; **Field (or Wildcat)** Wildcat

Air Quality

(possible concerns)

Long drilling time: No, 4 to 5 days drilling time.

Unusually deep drilling (high horsepower rig): No, small single derrick drilling rig to drill to 2700' TD, Rierdon Formation.

Possible H₂S gas production: No possible H₂S.

In/near Class I air quality area: No Class I air quality area nearby.

Air quality permit for flaring/venting (if productive): Yes, DEQ air quality permit required under 75-2-211.

Mitigation:

☒ Air quality permit (AQB review)

☐ Gas plants/pipelines available for sour gas

☐ Special equipment/procedures requirements

☐ Other: _____

Comments: No special concerns – using small rig to drill to 2700' TD.

Water Quality

(possible concerns)

Salt/oil based mud: No, freshwater, freshwater mud and air/mist drilling fluid system.

High water table: No high water table anticipated.

Surface drainage leads to live water: No, closest drainage is Wescott Coulee, an ephemeral drainages and an unnamed ephemeral drainages. Wescott Coulee is about 5/16 of a mile west and the unnamed drainage is about 1/8 of a mile to the southeast of this unnamed ephemeral drainage

Water well contamination: No, closest water wells are about 5/8 of a mile to the southeast and about 3/4 of a mile to the southeast from this location. The depth of these stock and domestic water wells varies from 116' to 200' in depth. Surface hole will be drilled with freshwater and freshwater mud, rule 36.22.1001. Steel surface casing will be set from 350' and cemented to surface to protect groundwater, rule 36.22.1001.

Porous/permeable soils: No, sandy bentonitic soils.

Class I stream drainage: None

Mitigation:

☐ Lined reserve pit

☒ Adequate surface casing

☐ Berms/dykes, re-routed drainage

☐ Closed mud system

☐ Off-site disposal of solids/liquids (in approved facility)

☐ Other: _____

Comments: 350' of surface casing cemented to surface adequate to protect freshwater zones, rule 36.22.1001. Also, air and air/mist and/or freshwater and fresh water mud systems to be used to drill mainhole. 5 1/2" production casing will be cemented to surface, if production is encountered.

Soils/Vegetation/Land Use

(possible concerns)

Stream crossings: No, stream crossings anticipated.

High erosion potential: No, small cut, up to 4.0' and moderate fill, up to 13.0', required.

Loss of soil productivity: No, location will be restored after drilling, if nonproductive. If productive unused portion of drillsite will be reclaimed.

Unusually large wellsite: No, 250'X250' location size required.

Damage to improvements: Slight, surface is grazing land.

Conflict with existing land use/values: Slight

Mitigation

☐ Avoid improvements (topographic tolerance)

☐ Exception location requested

☒ Stockpile topsoil

☐ Stream Crossing Permit (other agency review)

☒ Reclaim unused part of wellsite if productive

☐ Special construction methods to enhance reclamation

☐ Other _____

Comments: Access will be over existing county road, Oilmont Road and using existing ranch access roads. A short access will be built off the existing trail into this location. Drilling muds and solids will be allowed to dry in the pits. Pits will be backfilled when dry. No special concerns.

Health Hazards/Noise

(possible concerns)

Proximity to public facilities/residences: Henry Ranch is about ¾ of a mile to the southeast from this location.

Possibility of H2S: No H2S anticipated.

Size of rig/length of drilling time: Small drilling rig/short 4 to 5 days drilling time.

Mitigation:

☒ Proper BOP equipment

☐ Topographic sound barriers

☐ H2S contingency and/or evacuation plan

☐ Special equipment/procedures requirements

☐ Other: _____

Comments: No concerns. Working BOP (3000 psig Annular and Double Ram BOP), rule 36.22.1014 and adequate surface casing should mitigate any problems. Distance should mitigate any noise issues.

Wildlife/recreation

(possible concerns)

Proximity to sensitive wildlife areas (DFWP identified): None identified.

Proximity to recreation sites: None identified.

Creation of new access to wildlife habitat: No

Conflict with game range/refuge management: No

Threatened or endangered Species: Only species identified as threatened or endangered is the Black-footed Ferret. Candidate species listed is the Sprague's Pipit. NH tracker website lists only one (1) species of concern as the Ferruginous Hawk.

Mitigation:

- ___ Avoidance (topographic tolerance/exception)
- ___ Other agency review (DFWP, federal agencies, DSL)
- ___ Screening/fencing of pits, drillsite
- ___ Other: _____

Comments: Private surface grazing lands. There may be species of concern that maybe impacted by this wellsite. We ask the operator to consult with the surface owner as to what he would like done, if a species of concern is discovered at this location. The Board of Oil & Gas has no jurisdiction over private surface lands.

Historical/Cultural/Paleontological

(possible concerns)

Proximity to known sites: None identified.

Mitigation

- ___ avoidance (topographic tolerance, location exception)
- ___ other agency review (SHPO, DSL, federal agencies)
- ___ Other: _____

Comments: Private surface grazing lands. There may be possible historical/cultural/paleontological sites that maybe impacted by this wellsite. We ask the operator to consult with the surface owner as to his desires to preserve these sites or not, if they are found during construction of the wellsite. The Board of Oil & Gas has no jurisdiction over private surface lands.

Social/Economic

(possible concerns)

- ___ Substantial effect on tax base
- ___ Create demand for new governmental services
- ___ Population increase or relocation

Comments: Wildcat well. No concerns.

Remarks or Special Concerns for this site

Well is a wildcat 2700' TD Rierdon Formation test.

Summary: Evaluation of Impacts and Cumulative effects

No long term impacts expected. Some short term impacts will occur, but can be mitigated in a short time.

I conclude that the approval of the subject Notice of Intent to Drill (does/**does not**) constitute a major action of state government significantly affecting the quality of the human environment, and (does/**does not**) require the preparation of an environmental impact statement.

Prepared by (BOGC): Steven Sasaki
(title:) Chief Field Inspector
Date: June 7, 2013

Other Persons Contacted:

Montana Bureau of Mines and Geology, GWIC website
(Name and Agency)
Toole County water wells
(subject discussed)
June 7, 2013
(date)

US Fish and Wildlife, Region 6 website
(Name and Agency)
ENDANGERED, THREATENED, PROPOSED AND CANDIDATE SPECIES
MONTANA COUNTIES, Toole County
(subject discussed)

June 7, 2013
(date)

Montana Natural Heritage Program Website (FWP)
(Name and Agency)
Heritage State Rank= S1, S2, S3, T35N R3E
(subject discussed)

June 7, 2013
(date)

Montana Cadastral Website
(Name and Agency)
Surface Ownership and surface use Section 26 T35N R3E
(subject discussed)

June 7, 2013
(date)

If location was inspected before permit approval:

Inspection date: _____

Inspector: _____

Others present during inspection: _____